

Sequence Listing

(1) SEQ ID NO:1

(A) Length: 2096 base pairs

(B) Type: nucleic acid

```

1 ctctctgct cctegaagaa ggccaggcg gggctgccgc aagttttgac atttgcag
61 cggagacgcg cgcgggcact ctcgggccga cggtgcggc ggccggcgac cctccagagc
121 ccttagtcg cgcgccggcc ctcgcgtgc cggagtcgc gggccacga ggcgcagcgc
181 cgtctcccg cgttgcctc cccggcgcc gcagcatgt cccggggcc cgaggagtg
241 aaccggtca cggagagcac ctaccggaat gttatggaac agttcaatcc tgggtgcga
301 aatttaataa acctggggaa aaattatgag aaagtgtaa acgtatgat cctggcagga
361 aaagcctact acgatggagt ggccaagatc ggtgagattg ccactgggtc ccccggtca
421 actgaactgg gacatgtcct catagagatt tcaagtacc acaagaaact caacgagagt
481 ctgatgaaa atttaaaaa attcacaaa gagattatcc atgagctgga gaagaagata
541 gaacttgacg tgaaatatat gaacgaact ctaaaagat accaaacaga acacaagaat
601 aaattagagt ctttggagaa atccaagct gagtgaaga agatcagaag gaaaagccaa
661 ggaagccgaa acgcactcaa atatgaacac aaagaaattg agtatgtgga gaccgttact
721 tctctcaga gtgaaatcca gaaattcatt gcagatggtt gcaaagagge tctgctttaa
781 gagaagagge gcttctgctt tctggtgat aagcactgtg gctttgcaa ccacatacat
841 tattatact tacagtctgc agaactactg aattccaagc tgcctcggtg gcaggagacc
901 tgtgttgatg ccatcaaagt gccagagaaa atcatgaata tgatgaaga aataaagacc
961 ccagcctcta ccccggtgct tggaaactct caggcttcac ccatgatcga gagaagcaat
1021 gtggttagga aagattacga cacccttct aatgtctac caaatgccc ccccgctct
1081 tcaggcagag catataccag tccctgac gatatttta ataaccagc cagcgtgccc
1141 cgaattcac aaagggtaaa taattcaaca ggtacttcg aagatcccag ttacagcga
1201 tcagttcgg ttgcaacggg actgaacatg atgaagaagc agaaagtga gaccatctc
1261 cgcacactg cgggtccaa caagaccta ctcagcttg cacagggaga tgcatacag
1321 ctgctatcc cggaggagaa ggtggttg ctctatggag aacacgacgt gtccaaggcg
1381 aggggttggt tccgctctc gtacacgaag ttgctggaag aaatgagac agaagcagt
1441 accgtgccc cgcgaagccc cacaccagtg agaagcatc gcaccgtgaa cttgtctgag
1501 aatagcagtg ttgtatccc cccaccgac tacttggaat gctgtccat gggggcagct
1561 gccagacgga gagcagatc ggccaggacg acatccacct ttaaggcccc agcgtccaag
1621 cccgagaccg cggtctctaa cgatgccaac gggactgcaa agccgcttt tctcagcgga
1681 gaaaaccct ttgccactgt gaaactcgc cgcactgtga cgaatgatc ctcggcacc
1741 atcattegat gagaggacag ccaaggactc tccgggct ctcgggttct ccttgcgga
1801 atgatggcg cactctgtc gccacgtgct gacggtcgga aagcttcagt ggagaggcct
1861 aactctaat tgcctgctt aagcaaatc tcttctctg ttacagtag ttgggtgac
1921 aagtttctc cttaagata aatgagtaat agtctaatg ccagctcagc catttaaat
1981 attttcttc tattctgtc aagaaacagt aaacttggt tcaatctta aaaaaaaaaa
2041 aaaaaaaaaa aaaaaaaaaa aaaaaaaaaa aaaaaaaaaa aaaaaaa

```

(2) SEQ ID NO:2

(A) Length: 511 amino acids

(B) Type: amino acid

1 msrgpeevnr ltestyrnvm eqfnpglrlnl inlgknyeka vnamilagka yydgvakige
 61 iatgspvste lghvlieiss thkklnesld enfkkfhkei ihelekkie dvkymnatlk
 121 ryqtehnkl esleksqael kkirrksgs rnalkyehke ieyvetvtsr qseiqkfiad
 181 gckealleek rrfcflvdkh cgfanhihy hlqsaellns klprwqetcv daikvpekim
 241 nmieektpa stpvsqtpqa spmiersnvv rkdydtlskc spkmppapsg raytsplidm
 301 fnnpataapn sqrvnnstgt sedpslqrsv svatglmmk kqkvktifph tagsnktlls
 361 faqgdvitll ipeekdgwly gehdvskarg wfpssytkll eeneteavtv ptpsptpvr
 421 istvnlsens svvipppdyl eclsmgaaad rradsartts tfkapaskpe taapndangt
 481 akppflsgen pfatvklrpt vtndrsapii r

(3) SEQ ID NO:3

(A) Length: 1794 base pairs

(B) Type: nucleic acid

1 cacatataat aatagcaact cctggtegac tgattgacca ctgaaacct ttegtatttt
 61 ccaagtgetg gcaagegett cctgegcagg cggaggcgac ctggagtttg tgacgetgtg
 121 atggtctaga ggctggagat tcaagatctg ggtgceatca tttctggtt ctgttgatga
 181 cctcttcca gggtacatac agettacate ttgcatcctc aagegtttt cttataagge
 241 taaaaattca caaagcatat atcaatgaat caggaggatc tagatccgga tagtactaca
 301 gatgtgggag atgttacaaa tactgaagaa gaacttatta gagaatgtga agaaatgtgg
 361 aaagatatgg aagaatgtca gaataaatta tcacttattg gaactgaaac actcacgat
 421 tcaaatgtct agctatcatt gtaattatg caagtaaaat gttaaccgc tgaactcagt
 481 caatggcaga aaaaaacacc tgaacaatt ccttgactg aagacgttct cataacatta
 541 ggaaaagaag agttcaaaaa getgagacaa gatcttgaag tggtagctgc cactaaggag
 601 tcaagaatg aaaagttaa ggaagactta gaaagggaa aacgggtggt ggatgaacag
 661 caacagataa tggaatctct taatgtacta cacagtgaat tgaataataa ggttgaacaa
 721 tttctgaat caagaattct taatgaactg aaaactaaaa tgettaatat aaaagaatat
 781 aaggagaaac tcttgagtac ctggggcgag tttctagaag accattttcc tctgcctgat
 841 agaagtgtta aaaagaaaaa gaaaaacatt caagaatcat ctgtaaacct gataacactg
 901 catgaaatgt tagagattct tataaataga ttatttgatg ttccacatga tccatatgtc
 961 aaaattagtg attccttttg gccacettat gttgagctgc tctgcgtaa tggaaattgce
 1021 ttgagacatc cagaagatcc aaccgaata agattagaag ctttccatca gtaaaaggat
 1081 gttttctttt ttccacagt aaaaattctt atcattcaag gatattggaa ccacaggact
 1141 atttgataaa aaaacattat ttgcaaatta atgecatag tactttatt gcaaaatgce
 1201 atgtgetgce atctattatt catttttaaa tggcatttc ttattcagt agtgetttag
 1261 tgttttaaac tatatggata agaatgcagg tagataatat tctaggcata aaacatttaa
 1321 tgtaccttac ctcatgcaat attctttgga ttctttgttg atttatgata ttgctaatat
 1381 aatattttct taaaatatat aacaatatct ttatgcatt tgagtccag ctgggtgctc
 1441 tttatattta gaaattataa tgggaaggct atttaatta cagatggttt taaaattgag
 1501 gtaatatctg aggtggcata atttaaaaat atttagcaaa tttgttcat atatactgc
 1561 ttatttctag atttgtttta aattggaata tgaataacta atggataaag ctgcataaa
 1621 attgatattt tagttgttat tattaatata tcatgttacc ttatatatta atctactctt
 1681 gattctgcta attattacca acaaaattgt attcatgaca ttttattaat cctctgtgaa
 1741 tttctgtaa ataaaattat ttctgaaaat ctctaaaaaa aaaaaaaaaa aaaa

(4) SEQ ID NO:4

(A) Length: 269 amino acids

(B) Type: amino acid

1 mnqedldpds ttdvgdvtnt eelirecee mwkdmeecqn klsligteti tdsnaqlsl
61 imqvkeltae lsqwqkktpi tiptedvli tlgkeefqkl rqllemvlt keskneklke
121 dlereqrwld eqqqimesln vlhseknkv etfsesrfin elktkmlnik eykekllstl
181 gefledhfpl pdrsvkkkkk niqessvnl tthemleili nrlfdvphdp yvkisdsfwp
241 pyvelllrng ialrhpedpt rirleafhq

(5) SEQ ID NO:5

(A) Length: 1660 base pairs

(B) Type: nucleic acid

1 gccaggaaat gccctggagt gtgtgtcacc tgtccaggac gacttgttga ttccaggag
61 ggccgcttt cgggtctggg tccccgagag gactgccttg ctcacctgtc cctcggegc
121 ggccccgggg agctcccag aggcccccgg gatcgctggc cctccgaact ccacagcaat
181 gagcaagttg ggcaagttct ttaaaggggg cggtcttct aagagccgag ccgtccag
241 tccccaggag gccctggtec gacttcggga gactgaggag atgctgggca agaaacaaga
301 gtacctggaa aatcgatcc agagagaaat cgcctggcc aagaagcac gcacgcagaa
361 taagcgagct gcattacagg cactaaagag aaagaagagg ttcgagaaac agctcacta
421 gattgatggc acatttcta ccattgagtt ccagagagaa gccctggaga actcacacac
481 caaactgag gtgttgagga acatgggctt tgcagcaaaa gcgatgaaat ctgttcata
541 aaacatggat ctgaacaaaa tagatgatt gatgcaagag atcacagagc aacaggatat
601 cgccecaaga atctcagaag cattttctca acgggttggc tttggtgatg actttgatga
661 ggatgagttg atggcagaac ttgaagaatt ggaacaggag gaattaaata agaagatgac
721 aaataccgc ctccaaatg tgccttctc ttctctcca gcacagccaa atagaaaacc
781 aggcattgct tccactgcac gtgcacccg agcagcatct tcccagaggc cagaagaaga
841 ggatgatgat atcaacaat tggcagcttg ggctacctaa actaaaacac attttgata
901 cctaaattaa tgagctatag ataaaatata aaaaatgtt ttaccaagtt cagaagttaa
961 caaagactct gctttataat tatattgaat gaataattgt gtttaagcc tctaagtaa
1021 aagtaaaaaa ggagtcattg gcatacatag aatcagtgat ggaggccagg cagggtatct
1081 catgcctata atcccagcac tttgggaggc tgaggcagtt gagaccagga gtctgagtc
1141 agcctgacca acatgaagaa accctgtctg tactaaaaat acaaaaatta gccggacatg
1201 gtggcaggca cctgtaatcc cagctacttg ggaggctgag tcaggagaat cgcttgagcc
1261 caggagatgg aggttgcatg gagccaagat catgccactg cactccagac tgggcaacag
1321 agggagactc cgtctcaaaa actaaaaaaa aaaaatacat ttagtatagc ggggggtggg
1381 ggggagaaat aatgttattt cctatgcgaa tgacgtgtat cctgtacc atgttaaatg
1441 taaatatact gtgtctctt tgggagagcc ttttagtaga ggagtcttat atgagtctt
1501 acataagtag ttctacttga gttttcagtt ttgaaatctt aaaggagctt taattgacat
1561 ttattatacc aattaagctt ggaatggggc aatggatgca ttcccaaaa cgtgtgaaag
1621 cactaacagc ttatttctg gaatgagaat ctctgggtg

(6) SEQ ID NO:6

(A) Length: 233 amino acids

(B) Type: amino acid

1 msklgkffkg ggssksraap spqealvrlr eteemlgkkq eylenriqre ialakkhgtq
61 nkraalqalk rkkrfekqlt qidgtlstie fqrealensh tntevlrnmg faakamksvh
121 enmdlknidd lmqeiteqqd iaqaiseafs qrvfgddfd edelmaelee leqeelnkkm
181 tnirlpnvps sslpaqpnrk pgmsstarrs raassqraee edddikqlaa wat

(7) SEQ ID NO:7

(C) Length: 1666 base pairs

(D) Type: nucleic acid

1 agcgggcegcg gggctgcgag ctagggcggg agaaggagcg cggggaggac gtacctgtg
61 agatgcgagc cggccaacag cttgcaagca tgcctcctg gaccgagcc tggaggctcc
121 cgcgtgaggg actegggccc caeggeccta gcttcgcgag ggtgcctgtc gcaccagca
181 gcagcagcgg cggccgaggg ggcgcgcgagc cgaggccgct tccgtttcc tacaggttc
241 tggacgggga ggcagccctc cggccgctcg tctttttgca cgggctcttc ggcagcaaaa
301 ctaactcaa ctccatgcc aagatcttgg cccagcagac aggcctgct gacggtggat
361 gctcgttaacc acggtgacag cccccacagc ccagacatga gctacgagat catgagccag
421 gacctgcagg accttctgcc ccagctgggc ctggtgcct ggcctgctg tggccacagc
481 atgggaggaa agacagccat gctgctggca ctacagaggg tgagccgcc atgtctgggg
541 cctctccca ttcagtatat acctgaggg cctgcagge aacctgggac tcacatgatc
601 gttgatgac caagtcagg ctccaggagc catgctgag actccctatg tetgctaag
661 actggtccca gttcggttct ctcccacagc cagagctgg ggaacgtctc attgtgtag
721 atatcagccc agtggaagc acaggtgtct cccacttgc aacctatgtg gcagccatga
781 gggccatcaa catcgcagat gagctgccc gctccgtgc ccgaaaactg gggatgaac
841 agtcagttc tgcatecag gacatggccg tgcggcagca cctgctact aacctggtag
901 aggtagacgg gcgttcctg tggaggggta acttggtgc cctgaccag cacctagaca
961 agatcttggc tttccacag aggcaggagt cctacctgg gccaacactc ttctctctg
1021 gtggaaactc ccagttctg catccagcc accacctga gattatcgg ctcttcctc
1081 gggcccagat gcagacggtg ccgaacgtg gccactggat ccacgtgac cggccacagg
1141 actcatage tgcaccca ggttctctg tctaagagt gctggcaaga agatggcgg
1201 gcgtggtg gcctgctgt aattccagca cttggggagg ctaaggcggg aggatgactt
1261 gaggccagga gttggagacc agcctggcca acatggtgaa acctgtctc tactaaaaat
1321 acaaaaatta gcttggtg gtggtgcaca cctgtaatc cagctactct ggaggctgag
1381 gcaggagaat cactgaacc ctggaggcag aggttgcaat gagccgagat cacaccacta
1441 cactccagcc taggcaacag agcaagactc tgtctcaaaa aaacaaaac aaaaaggagg
1501 cacaaaacc caggettcaa gtctctgcag cctgctccac atttgggcac agaaggactc
1561 agacaggcac tgtgtgggca cgaggtttta caggggtggt cagacctcag gctttaatga
1621 ataaagacac tactcccaa aaaaaaaaaa aaaaaaaaaa aaaaaa

(8) SEQ ID NO:8

(A) Length: 101 amino acids

(B) Type: amino acid

1 mragqlasm lrwtrawrlp reglgphgps farvpvapss ssggrggaep rplplsryll
61 dgeaalpavv flhglfgskt nfnsiakila qqtgradgdc s

(9) SEQ ID NO:9

(A) Length: 23 base pairs

(B) Type: nucleic acid

GCTTCTGCTTTCTGGTTGATAAG

(10) SEQ ID NO:10

(A) Length: 22 base pairs

(B) Type: nucleic acid

GATTTTCTCTGGCACTTTGATG

(11) SEQ ID NO:11

(A) Length: 22 base pairs

(B) Type: nucleic acid

GAAACACTCACCGATTCAAATG

(12) SEQ ID NO:12

(A) Length: 22 base pairs

(B) Type: nucleic acid

GCTTTTGGAACTCTTCTTTTCC

(13) SEQ ID NO:13

(A) Length: 22 base pairs

(B) Type: nucleic acid

AGGGCAGAAGAAGAGGATGATG

(14) SEQ ID NO:14

(A) Length: 22 base pairs

(B) Type: nucleic acid

GTGCTGGGACTATAGGCATGAG

(15) SEQ ID NO:15

(A) Length: 20 base pairs

(B) Type: nucleic acid

CTGACGGTGGATGCTCGTAA

(16) SEQ ID NO:16

(A) Length: 22 base pairs

(B) Type: nucleic acid

GTGCCTGTCTGAGTCCTTCTGT

(17) SEQ ID NO:17

(A) Length: 21 base pairs

(B) Type: nucleic acid

AAGCACTGTGGCTTTGCAAAC

(18) SEQ ID NO:18

(A) Length: 21 base pairs

(B) Type: nucleic acid

AACACTCACCGATTCAAATGC